Corporate Disasters Some Lessons for Transformation

By PAUL BRACKEN



pplying the dynamic changes in corporate America is a feature of military transformation. Networked organizations, self-organizing systems, positive returns to scale, organizational agility, and sensory awareness are mentioned as characteristics of a revolution in military affairs. Each

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has a parallel in business, strengthening its attractiveness for the Pentagon. After all, companies did change in the 1990s, becoming less hierarchical and more networked, incorporating information technologies into daily operations, and using resources much more efficiently than the bureaucratic structures that went before.

Yet little consideration has been given to what is now obvious, that many companies which were once models of revolutionary change have come to grief: Enron, WorldCom, Vivendi, AOL Time Warner, Qwest, Global Crossing, Sunbeam, British Telecom, Marconi, Tyco, and AT&T. The list goes on and raises basic questions because all these firms underwent radical transformation and were either total disasters (Enron) or badly damaged (AT&T).

As the dust clears from transformation calamities in the private sector, the implications must be considered by defense planners. Yet corporate disasters are barely acknowledged in the debate. The Armed Forces seem stuck in the late 1990s when technological euphoria was as high as NASDAQ and the hype of the information economy and digital jargon on self-organizing systems could trump every argument.

In particular, most military transformation strategies still pose the central problem of getting laggards to realize that breaking out of longstanding behaviors is vital. Too many transformation briefings have the polemical tone of hitting people over the head with a PowerPoint two by four. Some

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1. REPORT DATE 2002	2 DEPORT TYPE			3. DATES COVERED 00-00-2002 to 00-00-2002		
4. TITLE AND SUBTITLE			5a. CONTRACT NUMBER			
Corporate Disasters Some Lessons for Transformation				5b. GRANT NUMBER		
				5c. PROGRAM ELEMENT NUMBER		
6. AUTHOR(S)				5d. PROJECT NUMBER		
				5e. TASK NUMBER		
				5f. WORK UNIT NUMBER		
7. PERFORMING ORGANIZATION NAME(S) AND ADDRESS(ES) National Defense University,300 5th Ave SW, Marshall Hall,Washington,DC,20319-5066				8. PERFORMING ORGANIZATION REPORT NUMBER		
9. SPONSORING/MONITORING AGENCY NAME(S) AND ADDRESS(ES)				10. SPONSOR/MONITOR'S ACRONYM(S)		
				11. SPONSOR/MONITOR'S REPORT NUMBER(S)		
12. DISTRIBUTION/AVAIL Approved for publ	ABILITY STATEMENT ic release; distributi	on unlimited				
13. SUPPLEMENTARY NO	OTES					
14. ABSTRACT						
15. SUBJECT TERMS						
16. SECURITY CLASSIFICATION OF:			17. LIMITATION OF ABSTRACT	18. NUMBER OF PAGES	19a. NAME OF RESPONSIBLE PERSON	
a. REPORT unclassified	b. ABSTRACT unclassified	c. THIS PAGE unclassified	Same as Report (SAR)	5		

Report Documentation Page

Form Approved OMB No. 0704-0188 enthusiasts claim that the challenge is making the services give up their bureaucratic ways to embrace the new organization. But this attitude fails to appreciate that the business landscape is littered with the carcasses of companies that were transformed. Who would argue today that the Pentagon should conduct business like Enron, to take the most extreme example of a networked, asset-light organization?

The problem is no longer getting people to embrace the need for change, but rather a more complicated one of managing change. Precision fires, networking, stealthy platforms, and space systems are widely appreciated. No serious defense analyst would question their contribution. In the past it made sense to point out their

transformation with too many links that must be meshed in time and budget is a risky proposition

benefits and call for changes in direction. But the issue today is understanding how to manage transformation—making it happen.

If the Pentagon is going to borrow from business experience it must examine both sides, in particular how many corporate transformations once held up as examples have since proven to be catastrophes. Ignoring the disasters is as big a mistake as concluding that military transformation is not needed at all or that large organizations are impossible to change.

Two-Edged Sword

The biggest lesson of corporate disasters is that large organizations are capable of explosive innovation. This places a colossal burden on leaders to think through exactly what they are doing. Conventional wisdom supports the conclusion of Max Weber: large organizations are conservative. Entrenched interests and bureaucratic politics combine to make fundamental change nearly impossible. If major change occurs at all, it will likely take decades to unfold.

Contrary to this view, corporate America in the 1990s underwent a

massive transformation. Businesses became more agile, networked, and innovative. New organizational forms such as the horizontal corporation and the virtual corporation sprouted up. Old models of corporate strategy based on slow motion change defined in terms of deterrence to entry and market power gave way to a focus on hypercompetition and permanent instability as enduring aspects of doing business.

But the capacity for radical change became a two-edged sword. American corporate leaders of the 1990s saw their job as getting their firms to accept change and convincing stockholders that the old ways would not work any longer. They succeeded to an extraordinary degree and got what they wanted. But in too many instances the change

> went in the wrong direction when measured by the yardstick of competitive success.

> AT&T, for example, was essentially a long-distance telephone company in 1997.

It then transformed itself into the largest national operator of cable television systems and at the same time pushed to retool these networks to make them digital and integrate telephony and broadband video. The strategic vision was to bundle services-telephone, television, and the Internet—to become the biggest supplier of information to companies and households. This required taking on a mountain of debt to buy cable systems and rework technology from analog to digital. But cash flow could not support the outlay because its core business, long distance, eroded faster than anticipated and new business, broadband to homes, did not take off fast enough to replace it.

In the AT&T case the overall strategic vision made perfect sense, but the timing did not. Synchronizing so many parts of the strategy was a basic assumption of the plan. If any piece of the transformation did not arrive on time or within budget the entire strategy failed, threatening to take the whole enterprise with it. The lesson is that simply having a strategic vision of change is not enough. Transformation with too many links that must be meshed in time and budget is a risky proposition and cannot be concealed forever behind the rhetoric of a digital

revolution. Such a revolution did occur, but unfortunately for AT&T there were so many timing problems that a firm that was once a paragon of the blue chip corporation is a shell of its former self. A management plan—and not just a vision—is needed for real transformation to succeed.

Self Disorganization

Another lesson is that the management challenges of transformation are new and complex. Often no one really understands how to deal with these challenges, which get little attention until it is too late. For example, using markets to trade commodity products makes good sense. Markets are efficient and balance supply and demand. And there is no reason that markets cannot be used to trade everything from oil and gas to broadband communications capacity.

But operating in several markets at once requires knowing comprehensive risks which arise from correlation across various markets that can cause losses in one to compound those in another. Likewise, systemic risks from financial exposure in debt markets can erode trust in the viability of a company. Loss of confidence would affect the ability of a trading company to operate in all of its markets systemically. Understanding such interactive risks is far different from understanding the particular details of one market only. No one is entirely certain how to do this.

A facile presumption is often made that people will learn to adjust to the new environment, in particular that if information is put out, a self-organizing behavior will take place as the different divisions of a firm coordinate, much as bees preserve the balance in a colony. Comparisons to beehives are made to suggest how a military force can best be organized. Self-organizing systems have been key in many discussions of the new economy, and they arise in debates on information technologies as well as command and control systems.

Self organization, while it occasionally takes place, is hardly automatic. What often occurs is self disorganization as each division suboptimizes to manage the complexities which confront it. Enron, for example,



transformed itself within five years into an essentially unregulated investment bank that made money from trading futures contracts on oil, gas, electricity, broadband, and other commodities. It raised money to build these trading systems by selling gas fields in Texas and power plants in South America. Moreover, it borrowed heavily to leverage its trading positions. Enron did not have to keep a minimum capital base as did its real competitors, the Wall Street investment banks. Because it was not regulated like a bank, it could transform hard assets such as gas pipe lines into soft ones—bits and trading

was once a natural gas company that

That Enron pursued an asset-light strategy, whereby information was substituted for hard holdings, makes its

positions. Enron carried this practice

farther than any other company.

lessons of special interest. Better intelligence and command and control, it is argued, can substitute for troops to produce more with less. But this example points to the need to understand how to execute this strategy on the operational and not merely conceptual level. It also reveals the risk of taking it too far. Invoking the economic notion of a self-organizing system, Enron had a strategic vision which, absent a management that understood the risks associated with it, created gigantic vulnerabilities which went unrecognized until it was too late.

Enron officials got rid of their assets. That was the easy part. But they had no experience or understanding as far as actually running such a complex enterprise. Their publicly-declared strategy was that they knew how to manage risk—shape it and transfer it to other markets. It is clear in retrospect that

they had no such knowledge. Enron ran up huge positions in different markets and was compelled to hedge them with hidden borrowing, which eventually led to financial collapse.

Clausewitz would have understood what happened at Enron. It exemplified his most basic principle: the essence of war is uncertainty. The purpose of assets—whether capital in business or force structure in war-is that the operating environment is highly volatile. Leverage—substituting information for hard assets—makes sense. but only when you understand what you are doing. Beyond that point the risks pile up quickly. Failure to learn this lesson invites disaster. That is not an argument for unneeded weapons or oversized force structure, but it does indicate that far more attention must be

given to understanding the tradeoff and operating with such a substitution.

Null Synergies

Many disasters arose from an acquisition binge that had good strategic logic. Globalization meant companies needed to be big and offer a full range of services. WorldCom, Vivendi Universal, Tyco, AOL Time Warner, and others seemed to demonstrate that building a business around a network would create huge synergies that would eventually destroy the competition.

It was argued that synergies between integrated companies could be exploited to transform competitors. AOL bought Time Warner in 1998 for \$65 billion under this rationale. Time Warner media resources could be rechanneled by expanding AOL Internet business. In effect, the Internet was

only when synergies are developed with utmost specificity have major advantages accrued

perceived as an integrating network of movies, books, magazines, and other entertainment that could be repackaged and resold over the net. AOL Time Warner was regarded as a model of the company of the future, whose synergies would drive unintegrated competition out of business.

Synergies built around the new technology of the net were behind mergers by other firms with similarly disappointing results. Vivendi Universal and Bertelsmann copied the AOL Time Warner strategy, believing that with networked systems there would be transformation in the way people availed themselves of information, leading to a convergence that necessitated far-reaching changes in the way companies delivered news and entertainment.

But these synergies were easier to identify on paper than to achieve. The strategy proved disastrous for these companies. Ironically, the firm that did not bet the farm on convergence and synergy, Viacom International, is now the most valuable media corporation in the world. In effect, its competitors self destructed by betting on synergies that never happened.

The problem is broader than AOL Time Warner or the failed efforts of the media industry. Some two-thirds of strategic rollups—acquisitions undertaken to transform an acquired company for synergy payoffs—are never realized. There is now even a name for this phenomenon in the management consulting trade: null synergies.

Broad statements on the benefits of synergy are suspect. Only when synergy is developed with utmost specificity in well described areas have major advantages accrued in business.

Positive Returns?

WorldCom, once the biggest provider of Internet traffic in the Nation, declared bankruptcy in July 2002. It grew enormously with a logic of positive returns, another new economy concept. Under this logic, adding a

new unit to the network adds to the power of the whole. It contrasts with negative returns, which are often used to describe the dysfunctional aspects of a bureaucracy. With

negative returns, as an organization grows, harmful effects arise from further growth because inertia and internal resistance grow more quickly than the benefits of size.

Both positive and negative returns are important concepts. But hard business experience illustrates that network technology alone does not guarantee a transformation to positive returns. WorldCom reveals the downsides that go with a strategy of positive returns, which is integral to the intellectual debate over military transformation but rarely rigorously analyzed. Too often it is used as an empty catch phrase without adequately describing either how it will work or its risks.

By swiftly expanding its digital network through a string of 65 acquisitions, including the \$37 billion purchase of MCI in 1998, WorldCom aimed to lock in the benefits of size. Locking in is another concept from the new digital economy. The bigger WorldCom got the more powerful it would become. Beyond a certain size,

the argument went, new emergent properties would appear, such as an ability to rapidly develop entirely new kinds of business that smaller competitors could not copy. WorldCom competitors would be locked out.

WorldCom developed a corporate culture that matched this strategy. Corporate culture in technology intensive companies—attitudes of company executives—has gotten too little attention. The culture supplies meaning that guides the actions of workers. And people, not technology, make business and the military work. WorldCom executives were almost belligerent in pushing network expansion. Strategy and culture were aligned.

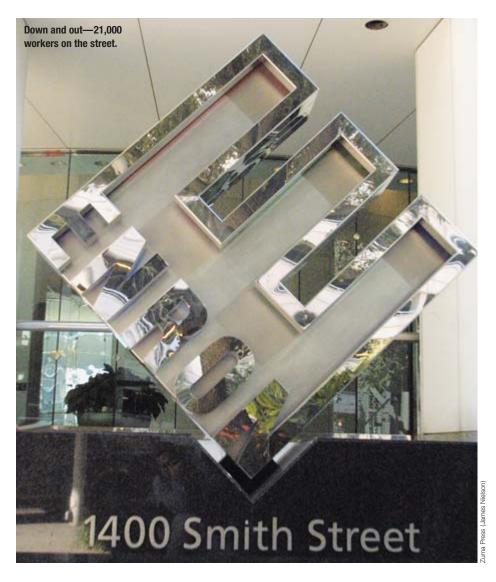
Many executives knew in early 2000, two years before bankruptcy, that profit margins were plunging, network capacity was increasing faster than demand, and cutthroat competition was accelerating. Most businesses in this position would hit the brakes, halting expansion and cutting expenditures for survival. Why did World-Com continue to make huge investments in expanding its capacity, incurring costs that had to be concealed through accounting gimmicks? The lock-in strategy required it.

Lock-in strategies magnify danger by encouraging unlimited financial backing in the belief that competitors will eventually be locked out. The WorldCom debacle shows how risky this view can be. Good money is thrown after bad for network systems that are not (yet) delivering expected results. The logic is that a transforming breakthrough will occur with a further commitment.

As DOD builds large networks that tie diverse systems together, this risk has to be carefully avoided. Risk controls and management attention given to such projects must be greater even than for large weapon systems like ships and aircraft. Yet for historical reasons this is not the priority today. If there is an area where smart oversight is needed, this is it.

Watch the Debt

Many corporate disasters arose from the simple fact that transformation is not free. It has to be financed. The companies that got in the most



trouble were those that went most deeply into debt to finance transformation. Telecommunications giants such as AT&T, Qwest, Global Crossing, and WorldCom stand out. By nature, telecommunications is capital intensive because fiber optic networks have to be built out, as happened with WorldCom.

When demand failed to grow companies were thrown into crisis. What happens next in capital intensive companies is that money issues, not technology development, become the strategy driver. Original technical concepts—fiber optics, wireless, broadband—were excellent. That was where corporate strengths were found, not in financial juggling.

One feature in many cases was the implausibility of corporate attempts to hide problems. Fabricating deals and declaring them to be revenue, borrowing using disguised subsidiaries in the Cayman Islands, and booking operating costs as capital expenditures were bound to be exposed. Corporations that used tricks were not particularly good at it, nor did they appreciate the traumatic impact that loss of confidence would have when the first inklings of what they were up to became public. This is one reason why most collapses occurred so quickly.

Although there is no debt per se in the defense establishment, examples of transformational weapons and programs that are mortgaging the future exist. The understandable tendency of the moment is to focus on the benefits of the transformed organization and not on the mortgage. But recent corporate disasters show that this leads to trouble.

The mortgage for military transformation must be carefully watched, not just fiscally. The lesson of corporate disasters is that all kinds of dysfunctional behavior follows when finances get out of balance. Public and congressional trust can evaporate, creating such a hostile climate that even well-thought-out recovery programs do not get a fair hearing. Leadership attention is directed at fighting the financial crisis rather than more basic matters. Day to day operations are starved of resources. The lesson is that there is more to financing transformation than adding up the costs of programs and comparing the sum to fiveyear budget estimates. While cost is important, trust and confidence of key constituencies is more important.

Corporate disasters can inform military transformation. They teach lessons that civilian and military leaders, program managers, and defense analysts can use as a checklist. At the same time, some may seize on corporate disasters to argue that transformation is not needed or is too difficult. Neither view is correct. Without a thorough appreciation of the challenges of transformation—and unless all available experience is examined the Armed Forces risk reliving lessons that corporate America has learned the hard way in recent years. JFQ